

XXXVIII.—On the large Flying-Squirrels referred to  
*Petaurista nitida*, Desm. By OLDFIELD THOMAS.

THE members of the *Petaurista nitida* group of Flying-Squirrels have not hitherto been very exactly determined, partly owing to want of Javan material, representing true *nitida*, and partly to doubt as to the application of Gray's name *melanotus*.

Now, however, thanks to the generosity of Mr. W. E. Balston, the Museum has received two good examples of the true Javan *nitida*, while an examination of Gray's type of "*Pteromys melanotus*" shows clearly enough to which form that name belongs.

Comparison of the whole series in the Museum shows that each of the four great Malayan land-arcas—the Peninsula, Sumatra, Borneo, and Java—has its own local form. All agree with each other in size and in the general characteristics of rich rufous colour with brown or black nose-tip and chin, hands, feet, tail-tip, and a variable amount of black round the eyes and behind the ears.

The diagnostic characters of the different forms are as follows:—

*Petaurista nitida melanotus*, Gray.

*Pteromys melanotis*, Gray, P. Z. S. 1836, p. 83 (*nom. nud.*).

*Pteromys melanotus*, Gray, Charlesw. Mag. Nat. Hist. i. p. 584 (1837).

General colour bright bay, the head markedly lighter than the body. Ears comparatively long and narrow, coloured like the head, except that the hinder part of their outer surface has generally a certain number of long black hairs upon it. Dark eye-rings inconspicuous. Hands and feet not wholly dark, the rufous trespassing more or less upon the metapodials.

*Hab.* Malay Peninsula and neighbouring islands. Examples in Museum from Perak, Selangore, Malacca, Johore, Singapore, and Pulo Tioman.

*Type.* Young. B.M. no. 116 a.

It is rather unfortunate that the name *melanotus* falls on the form which is markedly less black-eared than either the Sumatran or Bornean animal, but the light head of the type and its "bright red-bay colour" (in 1837—now somewhat dulled by time) indicate that it can only be referred to the present subspecies.

*Petaurista nitida marchio*, subsp. n.

Colour comparatively dark, a number of the dorsal hairs with black ends, which overlie and partly hide the deep rufous chestnut of the fur in general. Ears themselves not unlike those of *melanotus*, though the dark hairs of the metectote are blacker and more prominent; but in addition the long hairs of the side of the head behind the ears are also black-tipped so as to form a darker area in this region. Hands with the chestnut penetrating on to the metacarpals nearly to the base of the digits.

Condyllo-basal length of skull 67.2 mm.; upper tooth-row, exclusive of  $p^4$ , 15.5.

*Hab.* Sumatra. Type from Si Rambai; another specimen from Kotta Sani, near Solok (*Weber*), and a third from "W. Sumatra" (*Faber*).

*Type.* Adult female. B.M. no. 0.8.2.24. Collected by Dr. E. Modigliani in 1890-91 and presented by the Museo Civico, Genoa.

*Petaurista nitida rajah*, subsp. n.

"*Pteromys melanopsis*, Gray" \*, Mottley & Dillwyn, Nat. Hist. Labuan, p. 2 (1855).

"*Pteromys melanopsis*, Mottl. & Dillw.," Trouess. Cat. Mamm. i. p. 397 (1899) \* (in synonymy of *P. nitidus*).

Ground-colour almost as light as in *melanotus*, but darkened by blackish tips to the dorsal hairs, so that the general colour is intermediate between that of *melanotus* and *marchio*. Head like body. Dark orbital rings at a maximum. Ears apparently shorter than in the other forms and less narrow; their backs heavily tufted with deep black hairs, which form a conspicuous black patch on each side. Hands and feet wholly dark, the rufous not trespassing on to the metapodials.

Condyllo-basal length of skull 64.5 mm.; upper tooth-row, exclusive of  $p^4$ , 14.

*Hab.* Borneo. Type from Mt. Dulit, Baram, E. Sarawak. Alt. 2000'.

*Type.* Adult female. B.M. no. 99.12.9.31. Collected 1st October, 1896, and presented by Dr. Charles Hose.

*Petaurista nitida nitida*, Desm.

*Pteromys nitidus*, Desm. N. Dict. d'H. N. xxvii. p. 403 (1818); *Mamm.* ii. p. 342 (1822).

Colour darker and more brownish chestnut than in the

\* Should any eccentric nomenclaturist wish to resuscitate either of these misprints as the name of the Bornean subspecies, the type of the name would be Mr. Dillwyn's specimen No. 51. 5. 6. 7.

other forms, especially posteriorly, where the dark tone of the hinder back and thighs grades into the dark of the feet, instead of being contrasted with them. Head like body. Dark orbital rings scarcely perceptible. Hairs on back of ears not darker than those on rest of head. Hands and feet wholly dark brown or black.

*Hab.* Java. Specimens examined from Preanger and Buitenzorg.

### XXXIX.—*The Nomenclature of the Flying-Lemurs.*

By OLDFIELD THOMAS.

IN the 'Proceedings of the Biological Society of Washington' Mr. G. S. Miller\* has recently drawn attention to the unfortunate fact, first published by Palmer, that the well-known name of *Galeopithecus* is antedated by *Cynocephalus*, each name having the same type, the *Lemur volans* of Linnæus.

But the conclusions drawn by Mr. Miller as to the consequent names of the family and its two constituent genera are, as I believe, all invalidated by the important fact that the type locality of Linnæus's *Lemur volans* is the Philippines, and that therefore the name *volans* and the many generic names based on it, *Cynocephalus*, *Galeopithecus*, *Galeopus*, *Dermopterus*, and *Pleuropterus* †, are, like *Colugo*, all applicable to the Philippine form and not to the Malayan one.

The references are as follows:—

*Lemur volans*, Linn. Syst. Nat. (10) i. p. 30 (1758), ex Petiver, Bontius, and Seba. The quotations being:—

*Cato-Simius volans camelli*, Pet.(iver), Gaz.(ophylacii Naturæ et Artis), t. 9. f. 8 (1702); and Act. Angl. 277. n. 1065 (= Phil. Trans. Roy. Soc. pt. 277, included in vol. xxiii. 1704).

*Vespertilio admirabilis*, Bont.(ius), Java, p. 68 (1658).

*Felis volans ternatea*, Seba, Mus. i. p. 93, pl. 58. figs. 2 & 3 (1735).

Of the three authors quoted, Petiver has to be taken as the primary one, both because I consider it compulsory to take the first one (except when Linnæus quotes his own earlier works) and also, in this case, because the localities given by Bontius and Seba (Guzerat and Ternate respectively) are

\* P. Biol. Soc. Wash. xix. p. 41 (1906).

† An additional name, *Galeolemur*, has been formed in the group, based on Temminck's "*Galeopithecus macrurus*" from Ceylon. But this animal proves, as might have been expected from its locality, to have been a Flying-Squirrel (*Petaurista*). Cf. Schlegel, Mon. Singes pp. 335-6 (1876).